A REVISED ACCOUNT OF THE QUEENSLAND LECYTHIDACEAE.

By C. T. White, F.L.S., GOVERNMENT BOTANIST OF QUEENSLAND.

(With Plate xliv.)

In going through the *Barringtonia* and *Careya* material in the Queensland Herbarium, it was found that previous accounts of the species found in Queensland of the former genus were considerably in need of revision, and the following account of the Queensland plants of both genera is offered in the hope that it may prove acceptable to Australian botanists. The advisability of keeping these plants and their allies as a distinct family from the *Myrtaceae* is now generally recognised.

BARRINGTONIÁ Forst.

BARRINGTONIA SPECIOSA Forst.

B. speciosa, J. R. & G. Forst., Char. Gen., 76, t. 38, figs.
A. B. & C.; Benth., Fl. Austr., iii., 248; Bail., Queens. Flora, ii., 666; F. v. Muell., Fragm., ix., 118; Miers, Trans. Linn. Soc., Bot., i., 56, t. 10; Agasta asiatica, Miers, Trans. Linn. Soc., Bot., i., 61, t. 12, figs. 10 to 16.

Habitat.—Cape York, Dayman's Island, and Endeavour Straits (W. Hill); Rockingham Bay (Dallachy); Dunk Island (E. J. Banfield).

The fruits are commonly picked up on the ocean beach both in northern and southern localities.

Distribution.-India, Ceylon, Malaya, and Polynesia.

BARRINGTONIA CALYPTRATA R.Br.

B. calyptrata, R.Br. ex Benth., Fl., Austr., iii., 288; Bail., Queens. Agric. Journ., xviii., 125; B. racemosa, F. v. Muell., Fragm., ix., 118; Bail., Queens., Fl., ii., 666; Rept. Aus. Assoc. Adv. Science, vii., 435; Rept. Bellenden Ker Exped., 42 (non Gaud.); B. edulis, Bail., Qland. Agric. Journ., xviii., 125, Pl. xi.; Butonica calyptrata, R.Br., ex Miers, Trans. Linn. Soc., Bot., i., 76; Huttum calyptratum, Britten, Journ. Bot., xxxix., 67 and Illustr. Bot. Cook's Voy., ii., 40, Pl. 123 (with synonyms).

Habitat.—Lizard Island (Banks and Solander), Rockingham Bay (Dallachy), Mulgrave River and Hammond Island (F. M. Bailey), Cairns (Dr. F. H. Kenny), Kamerunga (H. Newport), Johnstone River (H. J. Ladbrook), Bloomfield River (Rev. W. Poland), Port Douglas (J. P. Reynolds).

Distribution.—Papua: Yule Island (C. T. White).

Note.—The following is a note received from Mr. J. P. Reynolds, Port Douglas on this plant—"It is known locally as Corn-beef Wood as when it is first cut it has a smell like corned beef, it has been cut up for fruit cases, but is considered too heavy for that purpose."

Barringtonia Longiracemosa, sp. nov. (Plate xliv.)

Arbor, ramulis subvalidis; foliis breviter petiolatis ellipticolanceolatis breviter et obtuse acuminatis infra •medium sensim cuncatis utrinque glabris et reticulatis, marginibus minute denticulatis; racemis terminalibus elongatis multifloris; floribus modice remotis, pedicellis tenuibus (ca. 1.3 cm. longis), calyce quadrilobo, petalis oblongis, ovario 4-loculari.

A tree, branchlets rather stout. Leaves lanceolate or elliptic-lanceolate, bluntly acuminate, gradually narrowed at the base into a short petiole, prominently reticulate on both the upper and lower surfaces, margins minutely denticulate, 6-10 in. (15-25.5 cm.) long, 1\frac{1}{4}-2\frac{3}{4} in (4.5-7 cm.) broad, petiole 2-4 lines (5-9 mm.). Racemes terminal, slender, elongate [all broken in our specimens, the longest part measuring about 14 in. (35.5 cm.)], rhachis puberulous. Flowers not crowded; pedicels about 6 lines (1.3 cm.) long; calyx about 6 lines (1.3 cm.) long, breaking into 4 rounded segments or lobes; petals oblong, 7 lines (1.5 cm.) long, 4 lines (9 cm.) broad (in

the dried specimens light-brown streaked with white); stamens numerous, the longest about 1 in. (2.5 cm.) long; ovary 4-celled.

Habitat.—Johnstone River (Dr. T. L. Bancroft).

Distribution.—Endemic in Queensland.

These specimens had previously been placed in the Queensland Herbarium with some doubt under *B. acutangula* from which however they differ in possessing larger leaves, very much larger flowers and 4-celled ovaries.

I am much indebted to Prof. Ewart for the loan of a series of specimens of B. acutangula from the Northern Territory for purposes of comparison. The Australian plant has been separated by Miers (Trans. Linn. Soc., Bot., i., 87) as a distinct species under the name of Stravadium gracile, and he himself suggests that two species may be represented under this name; they are both however very distinct from the Queensland plant. Whether Miers name shall stand or whether there are more than one species in the Northern Territory only a larger series of specimens than at present exists in any collection will show.

Barringtonia sp.

Habitat.—Johnstone River (Rev. N. Michael).

Mr. Michael's specimens are in fruit and may quite likely be identical with B. longiracemosa but the leaves are much larger, in the specimens to hand attaining 17 in. (43.5 cm.) in length and $6\frac{1}{4}$ in. (16 cm.) in breadth; the fruits (immature) are $1\frac{1}{2}$ in. (4 cm.) long and acutely angled.

CAREYA Roxb.

Careya australis F. v. M.

Careya australis, F. v. M., Fragm., v., 183; Bail., Queens. Flora., ii., 667; Comprehns. Cat. Queens. Plants, 209, fig. 184; Ewart & Davies, Fl. North. Terr., 198 (also p. 199 under Barringtonia by a misplacement of text); Lauterb. in Lorentz Nova Guinea, viii., 313; C. arborea, Ten. Woods., Proc. Linn. Soc. N.S.W., vii., 81 (non Roxb.); C. arborea var. australis, Benth., Fl. Austr., iii., 289; Barringtonia Careya, F. v. Muell., Fragm. Phytog., v., 183; Planchonia crenata Miers, Trans. Linn. Soc. (Bot.), i., 91, Pl. viii., figs. 1-15.

Habitat.—Very common in Queensland and generally known colloquially as "Cockatoo Apple." It is represented in the Queensland Herbarium from as far south as Fraser Island (Coll. W. R. Petrie, who states he has also seen it growing on the mainland opposite at Torquay); from thence it extends practically all round the Queensland Coast to the Gulf of Carpentaria.

Distribution.—New Guinea.

EXCLUDED SPECIES.

Barringtonia racemosa Gaud. The Australian plant is B. calyptrata R. Br.

Barringtonia acutangula Gaertn. This species was recorded by Mueller (second Census Aus. Pl., 102) from Queensland; it is recorded by Bailey (Queens. Fl., ii., 667) from "Around the Gulf of Carpentaria." There are, however, no specimens of the plant from any Queensland locality in the Queensland Herbarium, and Prof. Ewart informs me that neither are there any from a Queensland locality in the National Herbarium, Melbourne; therefore, though it is very likely this species does occur in the north-west of the State, I think it better that it should be removed from the list of Queensland species until authentic specimens have been collected.